WHAT IS CLAIMED IS:

1. An antibody which binds to an epitope on gp39, wherein said epitope is distinct from the epitope bound by IDEC-131, wherein said antibody has a non-agonistic effect on T-cell activation and inhibits gp39/CD40 interaction.

2. An improved method of treating a disease treatable by modulating gp39 expression or inhibiting the gp39/CD40 interaction wherein said method comprises administering a therapeutically effective amount of a antibody specific for gp39, wherein said antibody inhibits the gp39/CD40 interaction and is non-agonistic of T-cell activation.

3. The improved method of claim 2 wherein said disease is caused by IL-2 secretion.

4. The improved method of claim 2 wherein said disease is an autoimmune disorder.

5. The improved method of claim 4, wherein said autoimmune disorder is selected from the group consisting of rheumatoid arthritis, psoriasis multiple sclerosis, diabetes, systemic lupus erythematosus and ITP.

6. The improved method of claim 2 wherein said disease is a non-autoimmune disorder.

7. The improved method of claim 6, wherein the disease is graft-versus-host disease or graft rejection.

8. An antibody which antagonizes B-cell differentiation and antibody production and is non-agonistic of T-cell activation.

9. A pharmaceutical composition which comprises the antibody of claim 1.

10. A DNA sequence which encodes for an antibody according to claim 1.

11. An expression vector which contains a DNA sequence according to claim 10.

12. A method of suppressing humoral and/or cellular immune responses against cells or vectors administered during cell or gene therapy comprising further administering prior, during or after gene therapy an amount of an antibody according to claim 1 sufficient to suppress humoral and/or cellular immune responses against the cell or vector used during cell or gene therapy.

13. The method of claim 12, wherein the vector is a viral vector, a DNA or an antisense RNA.

14. The method of claim 13, wherein the viral vector is an adenovirus or retrovirus.

15. An improved method of treatment which involves the transplantation of cells, tissues or organs of the same or different species into a subject in need of such treatment, wherein the improvement comprises administering an antibody according to claim 1 prior, during or after transplantation, in an amount sufficient to suppress immune responses against said transplanted cell, tissue or organ or to suppress immune responses elicited by the transplanted cell, tissue or organ against the host.